Salisbury – Rowan Utilities ANNUAL WASTEWATER SYSTEM REPORT

This report covers the year from January 1 through December 30, 2005

On July 21, 1999, North Carolina's Governor signed into law House Bill 1160, placing reporting requirements on municipalities that operate wastewater collection and treatment systems. This legislation mandates that Salisbury – Rowan Utilities publish an annual report informing system users of specific items such as the number of system overflows, violations of permit conditions or environmental regulations, the impact of any such violations on the environment, and corrective measures taken to minimize recurrences.

This is available on-line at www.salisburync.gov. Any questions pertaining to this report should be directed to Environmental Services Manager, Carol Hamilton at 704-638-5375.

Salisbury-Rowan Utilities Treatment and Collection Staff Contacts:

Treatment Plants Manager - Randy Cauble - 704-638-4478

Operator in Responsible Charge of Salisbury-Rowan WWTP - Mike Frick - 704-638-5374

Operator in Responsible Charge of Second Creek WWTP - Martin Trexler - 704-638-5374

Operator in Responsible Charge of Residuals Management - Eric Helms - 704- 638-5379

Operator in Responsible Charge of Collection System - Randy Allman - 704-638-5390

SRU provides wastewater treatment at the Town Creek train located near Interstate 85 and the Grant Creek train off of Grubb Ferry Road. Combined effluents from both trains are disinfected with ultraviolet radiation at the Salisbury-Rowan Wastewater Treatment plant and discharged into the Yadkin River.

SRU treats industrial, commercial and residential waste from Salisbury, Landis, China Grove, Spencer, East Spencer, Rockwell, Faith and Granite Quarry. Gravity sewer lines and lift stations collect and pump the wastewater to the treatment trains. An average of 6 million gallons per day is treated using a process called activated sludge. Trash and rags are first removed by bar screens. Heavy particles such as sand and grit settle out as the flow slows in the grit chamber. The wastewater is then pumped to aeration basins, which contain *activated sludge*. The microorganisms or "bugs" feed on the wastewater particles. The process then moves to clarifiers where the "bugs" settle out leaving clear treated wastewater or *effluent*. UV is used for disinfection at the Salisbury-Rowan WWTP.

Solids "left over" from the treatment process are separated from the treated effluent by a filter belt press or plate and frame press. The solid material or "biosolids" that is left is applied to permitted farmland in Rowan County as a substitute for fertilizer. Only crops grown for animal feed can be raised after biosolids are applied. SRU's Land Application Program (Permit # WQ001956), Residuals Management, experienced another successful year in 2005. A combined total of 2,052.19 dry tons were land applied across 378.6 acres of farmland. Salisbury-Rowan Utilities has a total of 1,638.1 acres of land permitted.

SRU operates a North Carolina certified commercial laboratory where tests are run 6 days per week. The laboratory is supervised by, *John Ritchie*. He can be reached at 704-638-5376

Salisbury-Rowan WWTP - Permit NC0023884

There were no violations in 2005.

SRU also owns and operates the <u>Second Creek WWTP (Permit NC0078361)</u> on Highway 70. The package plant treats an average of 8,000 gallons per day in essentially the same manner as the Salisbury-Rowan WWTP but on a smaller scale. Chlorine is used to disinfect the effluent which is discharged into Second Creek. Solids are pumped and hauled to the Town Creek Treatment train.

A weekly and monthly BOD limit was exceeded in October 2005 A weekly BOD limit was exceeded in November 2005

Collection System Overflows (SSOs or Sanitary Sewer Overflows) in 2005

Date	Location	Gallons	Gallons into	Receiving Stream	Cause
3/28	Head of treatment train at Grant	*375	*375	Grant Creek	Heavy rain & high creek levels (ByPass)
3/28	2700 Bringle Ferry Road (600 gal)	600	520	Town Creek	Heavy rain & high creek levels
3/28	1216 Maxwell St	200	200	Grant Creek	Raining off and on
3/28	201 South Institute St	100	100	Grant Creek	Raining
5/7	525 Catawba Dr	40	40	Grant Creek	Roots
7/3	Northside LiftStation	2,400	2,400	Second Creek	Heavy Rain
7/28	Old 80 Lift Station	600	600	Church Creek	Heavy Rain
8/22	900 7th Street	60	50	Grant Creek	Roots / Debris in line
12/5	Northside LiftStation	600	600	Second Creek	Heavy Rain
12/15	Northside LiftStation	2400	2000	Second Creek	Heavy Rain
	Total Gallons	7000	6510		

All discharges of any amount that reach surface waters are reported to the Division of Water Quality at the Mooresville Regional Office.

In addition, any spills to the ground that exceed 1,000 gallons are reported. Salisbury-Rowan Environmental Services checks all receiving streams for dissolved oxygen, pH, temperature and any environmental impacts at upstream and downstream sites of each spill. If a discharge of 1,000 gallons or more reaches surface waters, a notice is placed in The Salisbury Post within 48 hours. If a discharge is more than 15,000 gallons, a notice is also placed in The Stanly News and Press to notify the affected area downstream of Salisbury. We are proud to report a reduction in spills this year.

In 2004 we had a total of 112,653 gallons spilled. *Note a Bypass is not considered as an SSO and is not included in the total amount.

<u>WHAT CAN YOU DO TO HELP?</u>





1. Don't Feed the Grease Goblin!

Don't pour grease or cooking oil in the kitchen sink. Put it in a soup can, freeze it and then throw it in the trash can! **Don't** use hot water to rinse grease off cooking utensils or eating utensils. Use a paper towel to wipe out a frying pan, then put the towel and food scraps in the trash!

2. Never put any item in the toilet except toilet tissue!

These items and others can cause problems in the lines and treatment plants:

Paper towels, Kleenex, disposable diapers, tampon applicators, feminine hygiene pads, syringes, cotton swabs, razors, surgical gloves, anything plastic, etc.

Please report anyone dumping any type of material into manholes, streams or storm drains to Environmental Services at 704-638-5375 or 704-638-5376. It is against the law!